# Request for Offers (RFO) Addendum

RFO Number:RFO0095
Addendum Number:1
Date of Addendum: _10/21/2015
Original Due Date, Time:10/26/2015, 2:00pm
Revised Date, Time: _10/26/2015, 2:00pm
Title: _MNLARS

#### **SCOPE OF ADDENDUM**

The following are questions and answers to the RFO:

# SUBMISSION/GENERAL

- Q. Is there an incumbent vendor and/or a current consultant performing these duties? If yes, will they be submitted for consideration? Do you have an incumbent contractor(s) either currently working, or who recently worked, on this project? Are the incumbents eligible to respond to this solicitation? If there are incumbents, can you provide the names of these incumbents?
- A. There is no incumbent or recent vendor working in this capacity.
- Q. In the Submission requirements you are asking for an onsite QA Manager, a QA architect and Lead QA staff members do the required and desired skills apply to all three types of positions?
- A. Yes, your organization needs to demonstrate five years of experience in the required skills. The QA Manager, QA Architect and Lead QA are key participants in the QA deliverable, and need to pass the required skills.
- Q. My question is whether each of the candidates we submit has to have 5 years of experience with the 2<sup>nd</sup> bullet highlighted below:
- Automated Regression testing in an enterprise multi-team (at least 4 Scrum teams) Scrum environment.

This seems like a pretty tall order since automation is still a relatively new concept in most orgs.

- A. See previous question and answer.
- Q. Do interviews need to be in person, or would phone/video work?
- A. Interviews will be conducted with the team of key individuals and a representative of the organization that can speak to the overall experience of the organization. Our preference is for the interviews to be in person. At least one member of the team must be in person; the others can be included via phone or video conference.
- Q. Is the use of offshore capabilities allowed?

This RFO is slightly different than the others you've released for the MNLARS project. Given the nature of it, will DPS allow the QA team to perform the duties offsite or will resources need to be onsite at DPS?

- A. Off shore capabilities are not allowed. Off site, but domestic capabilities are allowed.
- Q. How long has MN been doing agile development?
- A. The MNLARS project has been doing Agile for 20 months; however, the leadership and staff brought into the project have over 10 years of Agile at scale experience.
- Q. How mature is MN's Agile SDLC based upon AMM (Agile Maturity Model)?
- A. Managed.
- Q. What is the anticipated start date for the QA Team members?
- A. As soon as possible.
- Q. What type of a project is this? Enhancement, conversion or integration?
- A. MNLARS is new development, which when complete will totally replace the current DVS production systems.
- Q. For the Cost Proposal, please provide a project plan with milestones, number of anticipated Scrum Teams and dates so we may align our resourcing and related costs, to provide a "Total Cost for the two year project".
- A. We expect to have 25 full time developers across 4 SCRUM teams.
- Q. Vendors will be expected to bill for the deliverables, in this case successful completion of a sprint and program interval release cycle. Can you please confirm the above sentence from the RFO means we can only bill in 10 week interval periods?
- A. Sprints are two weeks long. Vendors will be allowed to bill monthly for sprints completed during the month.

### **TOOLS & TECHNOLOGY**

Q. Which tools are available for use? (test management, requirements/story management, defect management, etc...)

What testing tools is the State currently using for automation and data management and defect tracking/resolution? Does the State have a preference on the testing tools that would be used for this work? If so, please list the tools.

What automated tools are currently available? Does the State have existing automation or testing tools that they would like to leverage? Or will this team have the authority to suggest tools for the project?

Does the State have a Testing Management system such as HP ALM or JIRA?

- A. Rally is currently being used. The vendor may recommend additional automation tools. No specific test data management tools have been selected.
- Q. Will the State of Minnesota pay for tools selected for automation?
- A. Yes, for additional automation tools that are acceptable to both the vendor and the State of MN.

- Q. How much time is available for selecting tool? What is the turn-around for the State Procurement to secure and deploy automation tools?
- A. Rally is currently being used. Procurement time will depend on if they are already in use at the State of MN.
- Q. What accessibility tools does the State have? Does the State have accessibility tools, or resources available to conduct these unique types of tests? Please define MN's meaning and expectation of accessibility testing?
- A. A specific set of accessibility testing tools has not been selected. The MNLARS project expects the vendor will need to leverage a group of tools, acceptable to both the vendor and the State of MN, to provide end-to-end accessibility coverage.
- Q. What tools does MN already have in place for the MNLAR project?
  - o Project Management?
  - o Test Management?
  - o Versioning/Build Software?
  - Automation Testing?
  - Defect Tracking System?
  - o Performance/Load Testing?
  - o Mobile Testing?
- A. Rally is being used for portfolio, program and sprint management and can be leveraged for defect tracking and some portion of test management. TFS is being used for versioning and build management and has some limited capabilities for test automation. The MNLARS project has not yet selected tools for performance/load testing. MNLARS mobile testing will be limited to browser based testing on mobile platforms.
- Q. Are there any current processes/standards, other than what was mentioned in the link, that need to be followed (QA/testing)?
- A. No.
- Q. What level of approvals will there be, if any, on requirements, test cases and test run results?
- A. Test cases will be required to test a story. Test run results will need to be triaged and tracked in Rally.
- Q. What's the application & mobile platform? Oracle? Java? Etc?
- A. Currently MNLARS technology stack is .net, JQuery and SQLSerer.
- Q. What technologies are used to build this application?
- A. Currently MNLARS technology stack is .NET, JQuery and SQLSerer.
- Q. Will the MNLARS site interface with existing State systems or is it a stand-alone site?
- A. When fully released, MNLARS will be a stand-alone site, with interfaces to other state systems that required MNLARS data. The MNLARS project will have two production releases, the first for Vehicle Services and the second for Drivers Services. The most complex portion of the project will be during the approx. 12 months when the new MNLARS Vehicle Services system is in production. This will need to run seamlessly with the current production Driver's License system, which is then replaced with the final MNLARS production Drivers Services release.

- Q. Also will the existing mainframe application be maintained for a period of time after MNLARS site is activated and sunset at a future date?
- A. No. The current driver services production systems need to be shutdown at the same time the new MNLARS driver's services functionality is deployed to production. The same scenario will exist for Drivers Services.
- Q. Does MN have separate test, development and UAT environments?
- A. Yes
- Q. Is knowledge and testing of mainframes required for these positions?
- A. Yes
- Q. Does MN have mobile devices on site, or are they available through a virtual tool?
- A. MNLARS mobile testing will be limited to browser based testing on mobile platforms.
- Q. What Database and version is used by MN?
- A. SQL Server 2016
- Q. What development language is the product based on (.NET, Java, C#, etc.)?
- A. .NET
- Q. How many systems are being replaced/decommissioned?
- A. Two, the current mainframe system and ESupport.
- Q. How many applications are being developed?
- A. One
- Q. How many integration points are there?
- A. The MNLARS project, when completed will contain:

Services with External Systems

150 inbound services

40 outbound services

File exchanges with External Systems

10 inbound files

30 outbound files

Services with Internal Legacy Systems (temporary)

20 inbound services

20 outbound services.

- Q. Will testing with BCA systems that MNLARS might integrate with such as MNJIS be a part of this? If so, will the BCA be providing resources to assist with these efforts?
- A. BCA systems, such as MNJIS, are a part of the MNLARS scope. All interface partners are expected to provide their own testing resources to support the conversion of their interfaces to MNLARS.

#### **STORIES**

- Q. Are the 120 stories from a previous testing effort? If so, what is the complexity of the already completed 120 stories? What types of platforms involved: mobile, web, other apps, etc.?
- A. The 120 stores are a portion of the new MNLARS web platform.

- Q. "Provide automation for approximately 120 stories. These have already been completed, although they need to be incorporated into the same QA testing process outlined in items 1-3 above"... What do you mean by completed? Development complete or test complete?
- A. Development complete.
- Q. Has any testing been done on the 120 stories? If so, what has been done, what are the results of that testing, has mitigation work been started/completed for defects?
- A. Limited testing has been completed on the 120 stories using TFS automated testing. All identified defects have been resolved.
- Q. What is the anticipated total # of stories and requirements implemented in each 2 week sprint?
- A. At full staff, a ballpark estimate is 85 to 125 stories per sprint.
- Q. What is the level of user story maturity between 1-10, with 1 being vague and 10 being highly detailed and with acceptance criteria?
- A. There is a range of story maturity, an estimate would be 5.
- Q. How much time is available for test planning and strategy definition prior to the beginning of testing sprints?
  - How much time is available to assess the prior testing effort on the application: test cases, documentation, automation and defects?
- A. MNLARS leadership expects the vendor to provide a proposed testing approach, including recommendations for optimal test planning and strategy definition.
- Q. There is a reference on the first page under Point 1 "Sprint Strategy & Continuous Integration" states that QA needs a strategy on how they would integrate with continuous integration cycles with multiple development teams. Based on this, how many development teams will be concurrently working on code releases?
- A. There will be four development SCRUM teams.
- Q. How many sprint teams are anticipated?
- A. There will be four development SCRUM teams.
- Q. How many developers are on each sprint team?
- A. Approx. 5 to 6
- Q. How many BAs are on each sprint team?
- A. MNLARS is a large application which will rely on a number of Product Owners (PO) and Subject Matter Experts (SME). SCRUM teams will pull work from a consolidated backlog and POs and SMEs will groom the stories in priority order.
- Q. What is the size of the average scrum teams?
- A. 5 to 6 developers.
- Q. How many additional Scrum teams will the State be initiating in the next 30/60/90 days?
- A. All scrums teams are in place as of Oct. 21st. 2015

- Q. Will the UAT team be responsible for creating its own test case and data? Please clarify the QA Team's role in these activities.
- A. Yes. Test case and test data creation/management are the responsibility of the vendor.

# **QA TEAM**

Q. Is the expectation to have a complete team of QA (including a full complement of testers) or are you looking for the proposed team to consist of a QA Manager, Architect and Test Lead, with the vendor being allowed to fill in later with the testing team once the team has a better understanding of the QA requirements?

Explain your expectations regarding flex staffing for testing?

- Under 'Overall, the Quality Assurance Vendor will", can you further define what you are looking for in a 'flexible staffing model". Will there be notice when an increase in staff is needed? Will the vendor select the additional QA testers?
- A. The MNLARS project expects the vendor to onboard and off-board resources in the most efficient way as may be required to complete the deliverables outlined in the RFO.
- Q. The RFO clearly defines several roles for the selected vendor, i.e., QA Manager, QA Automation Architect, QA Leads. Does the State want the selected vendor to provide testers or will the State be providing those?
- A. The MNLARS Project expects the vendor to provide all of the resources necessary to complete the deliverables outlined in the RFO, including providing testers as required.
- Q. How many team members do you want initially? For the onsite QA Manager, a QA architect and Lead QA staff members?
- A. The MNLARS project expects the vendor to onboard and offboard resources in the most efficient way as may be required to complete the deliverables outlined in the RFO.
- Q. What level of business/user involvement is expected in each sprint?
- A. Product Owners and Subject Matter experts groom and signoff on each story in a sprint.
- Q. Anticipated total # of business groups and users that will be involved in UAT?
- A. The scope of all of the testing, including UAT, will include the primary business partner and approximately 85 interface partners involved in the specific production release.
- Q. Does the State anticipate significant lulls in code releases and testing needed thus explaining why they anticipate fluctuating levels of QA resources? It will take a significant amount of time to hire and train new resources to a point where they're fully productive later in the project than retaining the existing resources so staff retention would be preferred if possible.
- A. No, we do not anticipate lulls in code releases. In each sprint MNLARS anticipates completing 85 to 125 stories. Each Program Increment consists of 5 sprints. The MNLARS project expects the vendor to onboard and off-board resources in the most efficient way as may be required to complete the deliverables outlined in the RFO.
- Q. How soon do you anticipate engaging the QA resources in the project? Will QA be involved early in the project phases during requirements gathering?
- A. MNLARS is an Agile project. QA is involved throughout the development and deployment process.

- Q. What level of testing is required by the testing team (GUI Layer, API Layer, Backend Services Layer, Unit Layer)?
- A. Yes, all layers need to be tested.
- Q. Will the State be providing any testing resources? If so, please describe what role(s) they will play and number of resources for each role.
- A. The MNLARS development project will not be providing testing resources; however, interface partners will need to provide resources. Once MNLARS is released into production, State of MN staff may be hired to support the ongoing production testing needs.
- Q. The RFO clearly defines several roles for the selected vendor, i.e., QA Manager, QA Automation Architect, QA Leads. Does the State want the selected vendor to provide testers or will the State be providing those?
- A. The MNLARS Project expects the vendor to provide all of the resources necessary to complete the deliverables outlined in the RFO, including providing testers as required.
- Q. Has the MNLARS team received any training on how QA works in an Agile setting? If so, please elaborate on the training provided (type, basic training on the concepts, advanced on strategy/tactics, etc.)
- A. The entire MNLARS team has been trained in SCRUM and SAFe, which included how QA is positioned in an Agile project. If the vendor believes additional training is required, please include it in your presentation.
- Q. What development activities occur prior to the involvement of the SCRUM teams, or does all design, coding and unit testing occur within the planned scrum teams?
- A. MNLARS is aligned with the SAFe Agile methodology. In SAFe, high level architecture governs the overall design, but SCRUM teams do detailed design, coding and unit testing.
- Q. Will development certify their level of testing prior to checking in the code for software testing?
- A. Automated unit tests are built in the Continuous Integration build and if they fail the build fails. So by default, yes, development tests always successfully run prior to QA being provided a new software build.

#### DATA

- Q. How is data currently created and maintained for Testing?
- A. A subset of current production data will be obfuscated and made available for testing.
- Q. Will the testers have access to real world usage data?
- A. A subset of current production data will be obfuscated and made available for testing.
- Q. Does MN have system usage numbers and volume statistics available?
- A. Approximately 50 million inventory records (plates and stickers), 10 million vehicle records and 8 million driver records will be involved in the data conversion. Upon completion, MNLARS will be accessed by over 10,000 users.

- Q. Please provide detail on the data conversion: size of files being converted, data conformance state, is testing of "cleansed data" a part of this effort, are multiple data sources being migrated, etc.
- A. Approximately 50 million inventory records (plates and stickers), 10 million vehicle records and 8 million driver records will be involved in the data conversion. Conformance of current production data has already be completed by the data conversion team. Data is being migrated from the current production mainframe and several SQL databases.

This addendum shall become part of the RFO and should be returned with, or acknowledged in, the response to the RFO.
RESPONDER NAME:
SIGNATURE:
TITLE:
DATE: